Statement of

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on

the National Academy of Sciences Interim Report on Endangered and Threatened Fishes in the Klamath River Basin before the

Committee on Resources, U.S. House of Representatives

March 13, 2002

Good morning, Chairman Hansen, Ranking Member Rahall, and distinguished members of the Committee. I am Bill Hogarth, Assistant Administrator for Fisheries at the National Oceanic and Atmospheric Administration. On behalf of the Department of Commerce and the National Marine Fisheries Service (NMFS), I want to thank the Committee for the opportunity to participate in this important hearing on the National Academy of Sciences' Draft Interim Report on Endangered and Threatened Species in the Klamath Basin. I have a few opening comments and request that my written statement be included in the record.

Before I comment on the National Academy of Sciences report, I want to advise the Committee about a few key things we are already doing to address the Klamath situation.

As you know, over the past year the Administration has devoted substantial, senior level attention to finding solutions to the complex Klamath Basin issues. Most recently, on March 1st, the President announced the establishment of the "Klamath River Basin Federal Working Group"--comprised of the Secretaries of Commerce, Interior, Agriculture and the Chairman of the Council on Environmental Quality. The primary mission of this group is to advise the President on immediate and long-term solutions to enhance water quality and quantity and other complex issues in the Klamath Basin. The Working Group will solicit and include input from all stakeholders in its recommendations to the President. The Department of Commerce and NOAA, under the direction of Admiral Lautenbacher, will work closely with our other federal partners to yield productive results.

Second, NMFS recently received the U.S. Bureau of Reclamation's (BOR) biological assessment for operations during the period of 2002 to 2012. Our review of this document is underway, and we have been working through the issues. Our immediate goal is to conduct a prompt, thorough review, and to provide a biological opinion regarding plans to deliver water to Klamath farmers

in a timely fashion. I can assure the Committee that we will work hard to get the work completed as soon as possible, and I will be monitoring the progress of our efforts very closely.

Third, NMFS will continue to work with BOR, the U.S. Fish and Wildlife Service (USFWS), and other federal, state, and tribal interests to identify what measures can be taken to improve conditions in the Klamath River and its tributaries for threatened coho salmon--not just in 2002, but for the long-term. We must develop long-term management actions to provide certainty for farming, wildlife, fishing, and cultural interests, while also providing a sound basis for protecting and conserving fish populations. I commend Representative Walden and Herger, Senators Gordon Smith and Wyden and others for their support for legislation to conserve water, enhance water storage, and improve water quality in the Klamath River and its tributaries.

Fourth, NMFS scientists, in conjunction with others, will seek to update, expand, and incorporate new data to improve the understanding of threatened coho and their habitat, and in doing so, will produce better science that will guide actions affecting project operations, water quality, flows, and habitat conditions for coho salmon in the Southern Oregon and Northern California regions over the long-term.

I will now briefly describe the chronology of NMFS' involvement in the Klamath issue and its development of the 2001 Klamath Biological Opinion for coho.

Water Quantity and Quality Demands for Coho Salmon in the Klamath

Long-term planning efforts for Klamath Project operations began following a drought in 1994, which focused attention on competing needs for water in the Klamath Basin. Interest faded somewhat in the mid- to late 1990s, when the upper Klamath River Basin experienced normal to above-normal water supply conditions.

In 1997, NMFS listed Southern Oregon/Northern California Coast coho salmon as threatened under the Endangered Species Act. Critical habitat was designated shortly after that. Prior to 1997, little information was available regarding the relationship between Klamath River flows and the biological requirements of salmon and steelhead. This was particularly true for coho salmon, as this species is inherently difficult to study both because of its life history and because the populations of coho salmon are depressed.

Since 1997, a number of groups have gathered data and have developed analyses regarding the relationship between Project operations and other activities in the Basin, river flows, fish habitat, and water quality. Over the past few years, NMFS has worked diligently to understand and incorporate this new information, almost on a real time basis, as the new information relates to the annual planning process and consultations that have occurred.

As you may know, in the fall and winter, adult coho salmon enter the Klamath River and tributaries and spawn between October and February. Sufficient flows provide upstream passage and tributary access and allow for spawning in the mainstem river. In the spring, coho salmon hatch, emerge as small fish called "fry," and migrate to the river's edge between February and early June. Fry require appropriate habitat in order to grow and avoid predation. Current information shows that this type of habitat is generally found at the edges of a river.

Throughout the summer, juvenile coho salmon require appropriate habitat including acceptable water temperatures and quality. Water temperatures in the mainstem of the Klamath River regularly exceed optimum levels for salmon during summer months. Accordingly, juvenile salmon are believed to seek cooler water in available "thermal refugia" near springs and in tributaries featuring better habitat.

For the next six months, juvenile salmon continue to grow and remain in fresh water habitat. Between April and June, coho salmon juveniles from the previous year's cohort transition to the "smolt" life stage, and migrate to the ocean. During this period, flows need to be sufficient to provide adequate forage, predator avoidance, and passage conditions.

As you know, the drought last year --one of the worst ever--again focused the intense competition amongst water needs in the region and resulted in rushed and contentious operation planning for the Project.

NMFS and the 2001 Biological Opinion

In January 2001, BOR submitted a biological assessment to NMFS on its proposed project operation. BOR's proposed action was to operate the Klamath Project in the same manner as it had historically done over the years. During the development of the 2001 biological opinion, NMFS first considered all known minimum Klamath River flow recommendations developed by biologists over the past 50 years, including: (1) 1950s recommendations based on limited physical measurements and the professional judgement of California Department of Fish and Game biologists; (2) recommendations previously prepared for the Yurok Tribe; and (3) recommendations based on a number of available methods, outlined in the Phase I Flow Study by the Institute for Natural Systems Engineering (also known as the "Hardy Study" from Utah State University). NMFS also considered other temperature and habitat modeling results that were available at the time the 2001 biological opinion was developed.

Based upon these sources, in April 2001, NMFS determined that Reclamation's proposed operation of the Project was likely to jeopardize the continued existence of Klamath Basin coho salmon. The Biological Opinion provided alternative river flow recommendations for the period of April to September 2001. Based on spawning habitat modeling results, NMFS concluded that mainstem passage and spawning habitat, and tributary access, would be adequate with a flow of 1,300 cubic feet per second--the minimum flow for this time period that was previously

established by FERC. Habitat modeling for young-of-the-year coho salmon in the mainstem Klamath River indicated that under BOR's proposed 2001 action, habitat would be severely restricted. BOR and PacifiCorp, the manager of several dams on the Klamath River, acted in accordance with NMFS' recommended flows to avoid jeopardy as set out in the Biological Opinion. These actions contributed to irrigation water shortages that Project farmers suffered in 2001.

Beginning in late June, water temperatures in the mainstem Klamath River generally become too warm for salmon and steelhead. Most juvenile salmon in the mainstem likely make periodic use of "cool water refuges," areas in the river that are cooler than ambient conditions. While NMFS generally believes that water should be managed in the mainstem to optimize cool water refuges and, to the extent possible, optimize water temperatures and quality for salmon, little is known about how to specifically accomplish these goals in the Klamath River. As a result of the uncertainties and because tributaries would contribute very little water to the mainstem during the dry 2001 summer, NMFS, in its 2001 Biological Opinion, recommended the flows be set at 1,000 cubic feet per second, consistent with available biologist recommendations to date. This level of summer flow lies between FERC's minimum flows and the Phase I Flow Study Report recommended flows.

National Academy of Sciences Report

Last year, Secretary Evans and Secretary Norton called for an independent scientific review of the NMFS, USFWS and BOR's use of information in the 2001 Biological Opinions for Klamath Project operations. NMFS, USFWS, and BOR contracted with the National Academy of Sciences to provide an interim report within a few months, and a final report within about 18 months of the request.

I am grateful for the Academy's National Research Council's (NRC) dedication of time and analysis to ensure that NMFS and USFWS use the best peer-reviewed science. I have carefully reviewed the NRC's recently released interim report. The report points out four main conclusions: (1) there was strong scientific support for all Reasonable and Prudent Alternative requirements in the two Biological Opinions except for the alternative water management recommendations; (2) the proposed operation of the 2001 Klamath Project operation in the Bureau of Reclamation's Biological Assessment was not supported by available scientific information; (3) the flow recommendations included in the 2001 Biological Opinions prepared by NMFS and USFWS were not supported by available scientific information; and (4) there is no convincing scientific justification at the present time for deviating from the operational practices in place between 1990 and 2000.

The NRC's analysis reinforces that there is still much to be learned, and that policy decisions affecting the Klamath Basin need to be based on complete data, analyses, and modeling. NMFS is committed to working with USFWS, BOR, and other entities toward more informed and better

water and fish management decisions in the future. I recently sent a letter to Dr. William Lewis, chairman of the NRC committee that drafted the report, requesting clarification of certain technical issues regarding the effect of increased flows in the NRC's analysis on young coho salmon. As the NRC completes its final report, we will seek to address these technical issues in order to develop a robust opinion to support and implement the NRC's recommendations.

As the NRC's findings highlight, additional information is needed in order to develop better, longer-lasting water management solutions. Development of appropriate strategies may require a high level of scientific effort supported by sufficient funding. The proactive involvement of all interested parties will also be required to ensure that the scientific basis for providing for the needs of fish--as well as the needs of farmers, tribes, recreational fishermen and other users in the Basin-are understood and supported by all who are affected by federal management decisions.

I want to restate that we must act together to resolve these issues. I am committed to exploring all options with all interests to find long-lasting and satisfactory solutions to the difficult challenge of meeting the water needs for all interests in the Klamath Basin.

Thank you, Mr. Chairman, for the opportunity to address this Committee. I would be happy to address any questions that you or other members of the Committee may have.